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PRIMA-SOLDER
ME8452-A

Stress Free
100% Solid
Reworkable
Electrically Conductive
Epoxy Paste Adhesive

IDEAL FOR:

Snap Curing
 Large Area Die
 Automated Assembly
 Reworkability
 Mismatched CTE's

DESCRIPTION:

ME8452-A is an accelerated version of ME8452 for snap-curing applications. This novel silver-filled paste is reworkable, solvent free, and electrically and thermally conductive. It exhibits outstanding flexibility for bonding materials having highly mismatched CTE's (i.e., alumina to aluminum, silicon to copper).

It can be readily reworked from 80°C to 100°C and is ideal for applications such as large area die attach and substrate attach because of its ability to bond materials with highly mismatched CTE.

AVAILABILITY:

ME8452-A is available in syringes for automatic needle dispense applications or in jars. Both viscosity and thixotropic index can be modified to your specific needs.

APPLICATION PROCEDURES:

- (1) Thaw for 30 minutes before opening jar.
- (2) Dispense adhesive onto clean substrate.
- (3) Cure according to one of the recommended schedules.

TYPICAL PROPERTIES*

Electrical Resistivity (150 °C/ 30 minute)	<4x10 ⁻⁴ ohm-cm
Dielectric Strength (Volts/mil)	N/A
Glass Transition Temp.(°C)	-20
Current Carrying Capabilities	35 Amp/mm ²
Lap-Shear Strength	1000 psi 6.9 N/mm ²
Device Push-off Strength	2000 psi 13.8 N/mm ²
Hardness (Type)	80 (A)
Cured Density (gm/cc)	3.5
Thermal Conductivity	55 Btu-in/hr-ft ² -°F 7.9 W/m-°C
Linear Thermal Expansion Coeff. (ppm/°C)	120
Maximum Continuous Operation Temp. (°C)	175
Avg. Viscosity(0.5 rpm, 24°C) (Brookfield DV-1,spindle CP51)	255,000 cp

* Properties given are typical values and not intended for use in preparing specifications. The user is advised to evaluate the product in the manner the product is intended to be used in manufacturing and in the final product.

CURE SCHEDULES:

<u>Temperature</u>	<u>Time</u>	<u>Pressure</u>
100°C	2 hr	
125°C	1 hr	
150°C	30 min	

Pot life is >5 days at ambient of 25C or below.

1 cps= 1cP=1mPa·s; 1 psi= 145 MPa=N/mm²; 1 lb= 0.225 N; 1 inch=25.4 mm;
 1 V/mil= 25.4 kV/mm; 1 lb-in= 8.851 N-m

SHELF LIFE:

<u>Storage temperature</u>	<u>Shelf Life</u>
-40°C	1 yr
0°C	3 months

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